The GETAC Disaster/Emergency Preparedness Task Force was formed in August 2007 to provide the Governor's EMS/Trauma Advisory Council with recommendations regarding disaster preparedness for EMS and hospitals in Texas. The charge to the Task Force from Dr. Ed Racht, GETAC Chair, was formulated after consultation and collaboration with Department of State Health Services Assistant Commissioners' Stabeno and Perkins.

The Disaster/Emergency Preparedness Task Force shall provide recommendations:

1. related to the appropriate transportation of individuals with special medical needs in the event of a disaster in light of the limited medical transportation resources available in the state that includes the use of non-traditional transport methods based upon specific guidelines for modified standards of care;
2. for the statewide deployment of EMS provider resources through a NIMS compliant methodology that considers such methodologies as resource deployment in task forces and strike teams;

3. for a plan for the management of available acute care hospital beds; and

4. for a common terminology dictionary

Spring 2007 Recommendations

(In no specific order or priority)

Updated May 22, 2007

Definitions of terms used throughout this document:

Impact area/Impacted area - The portion of Texas that is directly threatened or impacted by the disaster and is most likely to suffer damage to power, water and/or other critical infrastructure.

Affected Area – The portion of Texas that is not in the impact area but has instituted emergency operations mode to deal with evacuees from the impact area

Non-Affected Area – the area of Texas that is unaffected by the disaster and is sending resources to assist the affected and impacted areas

NIMS - National Incident Management System

GDEM - Governor's Division of Emergency Management

DSHS - Department of State Health Services

RAC - Regional Advisory Councils

TSA - Trauma Service Area

DDC – Disaster District Committee

The GETAC Disaster/Emergency Preparedness Task Force members

appreciate the opportunity to provide recommendations through the Governor's EMS/Trauma Advisory Council to the Department of State Health Services. The Task Force members are honored to provide recommendations that are intended to improve the response of EMS and hospitals in times of disaster. The stakeholders recognize the significant responsibility DSHS has with respect to emergency preparedness and hope that the recommendations below demonstrate grass roots support for the department and its efforts to assist Texans in need. The formation of the Task Force demonstrates the Department's identification that collaboration of state, regional and local entities is critical to the ultimate success in disaster.

The Task Force has met monthly since August 2006. The recommendations below are provided to address the charges to the Task Force from Dr. Racht and the assistant commissioners. The Task Force presented interim recommendations to GETAC in November at the Texas EMS Conference. This document incorporates the interim recommendations and also includes other recommendations that have been developed since November to form a comprehensive recommendations document as 2007 hurricane season approaches. As the Task Force has met and discussed issues, additional issues have appeared. It is our belief that further work remains and it is prudent for the Task Force to continue to meet. The Task Force chairs would prefer to address the commissioners, other pertinent DSHS staff, and GETAC leadership to determine the best course of action and future of the Task Force.

1. Ambulance MOA Modifications (Ground)

The most current DSHS Memorandum of Agreement (MOA) has had <u>limited</u> response following 9 months of recruitment. At time of this writing, of the possible 3,000 licensed ambulances in Texas, only 100 ambulances and 3 air medical helicopters have committed to DSHS for the upcoming hurricane season via the MOA.

The Disaster/Emergency Preparedness Task Force recommends the following modifications:

- A. DSHS should establish a benchmark for a minimum percentage of EMS agencies signing the MOA Part B (State Missions). The Disaster/Emergency Preparedness Task Force recommends 100% of those EMS agencies with three (3) or more ambulances sign this portion of the MOA.
- B. Split the current MOA into two separate documents. The first document should address the state hospital and other state facilities evacuation contract with ambulances. The second

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document should address the state mission activations. Separating the documents will improve response, since many EMS directors feel the current document is too restrictive. Perception is important to improve participation in the MOA, as such the Task Force recommends separating the MOA as soon as possible to be a priority. To preserve current MOAs that may already be in place, the Task Force recommends splitting the documents in such a manner that the language is not substantively changed.

- C. Remove the requirement to enter exact numbers of ambulances in the actual MOA. The MOA should be an agreement between DSHS and the EMS agency on reimbursement, responsibilities, chain of command and other management issues. The requirement to put specific numbers of ambulances is problematic in many jurisdictions where EMS resources are minimally available on a daily basis. It also creates a situation where EMS agencies under-estimate the number of trucks they might be able to send. The Task Forces recognizes DSHS' need for planning numbers and therefore would support the gathering of those numbers through other methods not associated with the MOA(s).
- D. Stipulate that the number of units requested on the DSHS activation order will be the only units eligible for the state reimbursement process.
- E. Add a Supervisor/Strike Team Leader Unit Type at a specific cost per hour (personnel and vehicle) to ensure cost reimbursement of those assets. Strike Team Leader deployment is one component of NIMS compliance and will enhance command/control and accountability for the large numbers of ambulances in the field.
- F. Add an "Additional Personnel" Option at a specific cost per hour per resource type (BLS/ALS), including pediatric/neonatal transport teams and other specialty transport teams. The ALS Bus proposal (See item 3 below) requires additional EMS personnel but the current MOA does not allow reimbursement for additional personnel to man an ALS bus.

2. Air Medical Helicopter MOA modifications

The Texas Association of Air Medical Services (TAAMS) submitted recommendations to the Disaster/Emergency Preparedness Task Force for flat rate daily fees and per hour flight fees for reimbursement on the DSHS MOA. These fees are scaled to the size/capability of the aircraft, similar to the fees charged by the Army National Guard and govt-contracted firefighting helicopters. (See *Attachment 1* contained herein). The Task Force recommendation is that DSHS incorporate flexibility to allow both "mission by mission" and/or "extended duration deployment" of air medical assets. The scaled fee structure for daily rates and per hour

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flight fees <u>would be an effective method for utilizing</u> the same concepts as the ground ambulance MOA for reimbursement of actual personnel costs, supplies, etc for a new Air Medical MOA.

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3. Regional EMS Resource Coordination Centers

The Disaster/Emergency Preparedness Task Force recommends that each Regional Advisory Council (RAC) in Texas designate one or more Regional EMS Resource Coordination Center(s) to facilitate activation, deployment, and tracking of ambulances that are deployed for state missions in Texas. The Regional EMS Resource Coordination Center would serve as the EMS component of the regional MACC, and as the official point of contact for GDEM/DSHS and other agencies requesting EMS assets for that TSA. These centers should have 24/7 staffing, redundant power and communications systems, and sufficient capability to quickly contact and dispatch pre-assigned Strike Teams and Task Forces (as described later). It is highly desirable that these centers have daily familiarity with EMS operations and resource coordination. Having a central coordination point for all EMS resources in the regions should greatly accelerate the deployment process, either for hurricanes or nonotice deployments for large-scale incidents. Regions should determine if they need to designate multiple Regional EMS Resource Coordination Centers for back-up/failover. The Task Force recommends that as a part of the concept of operations the EMS Resource Coordination Centers be notified by DSHS through an integrated lateral communications method (i.e. EMResource).

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4. Ambulance Strike Teams

EMS Resource Typing: Standard EMS resources will be typed via FEMA/NIMS Guidelines

The Disaster/Emergency Preparedness Task Force recommends that ambulances and/or EMS personnel that are deployed for state missions in Texas follow the Strike Team/Task Force model of deployment to ensure compliance with NIMS/NRP, provide for easy integration into the Incident Command System and ensure appropriate command/control and accountability.

In order to effectively develop a state-wide system, resources should be pre-packaged in two primary ways for local, regional, and state-wide deployment:

 Local resources packages will be composed totally of resources from a single agency (e.g. Austin Travis County-EMS ST-1, Dallas Fire

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Rescue ST-1, Houston Fire Department ST-1, San Antonio Fire Department ST-1). This will include ambulances and supervision and will appear as a standing resource commitment on the regional and state-wide resource databases and be activated by the Regional EMS Resource Coordination Centers.

- Regional resource packages would be similar, but be composed of resources from the same RAC (Q ST-1, P ST-1, etc, utilizing the Alpha identifier to the Trauma Service Area). This will include ambulances and supervision and will appear as a standing resource commitment on the regional and state-wide resource databases and be activated by the Regional EMS Resource Coordination Centers.
- Agencies that provide EMS resources in less than a single strike team will be packaged in strike teams prior to assignment.

5. Specialized EMS Resource – Advanced Life Support (ALS) Bus:

In order to provide a viable alternative to ambulance transport for evacuation of multiple patient types and to leverage available EMS personnel, up to 100 ALS Buses should be staffed and deployed during catastrophic events. This project is still conceptual and in development. The ALS bus should not be confused with a military AmBus, which is designed as a litter-carrying bus. The ALS bus is a converted 47 passenger over-the-road bus with portable equipment and paramedics and other care-givers.

The Disaster/Emergency Preparedness Task Force recommends the State of Texas (either GDEM or DSHS) pursue funding to allow for the purchase of 100 Automated External Defibrillators (AEDs) for ALS bus equipment caches.

General Concepts of ALS Bus Staffing and Equipment:

Preferred staffing for ALS Buses would be 2 Paramedics and 2-3
 Facility Staff as a best case scenario but the on-scene Supervisor
 (authorized by the SOC/MACC) would have the capability to modify
 this staffing based upon patient need. Minimum ALS Bus staffing
 1 Paramedic/1 EMT-B. There was significant discussion within the
 Disaster/Emergency Preparedness Task Force that specifying
 minimum staffing levels could set the standard operational staffing
 levels. Given the wide variety of missions an ALS bus might
 perform, there was consensus with the minimum staffing
 recommendation, but it cannot be stressed enough that hospital

evacuation missions should have the preferred staffing levels of 5 caregivers.

 Equipment: ALS Jump Kit and AED + 3 Lead (Note: for the context of this recommendation, ALS=MICU in State of Texas Definitions)

6. Ambulance Strike Team Leader (STL) course

The Disaster/Emergency Preparedness Task Force recommends that all supervisory personnel who will deploy with an ambulance strike team successfully complete the TEEX Ambulance Strike Team Leader course. The 16 hour course has been developed with guidance from the California model, with two successful pilot courses to date. Final approval of the curriculum is expected by 1 May 2007. Ambulance STL course should be eligible for reimbursement to the sponsoring department similar to Regional Incident Management Team (IMT), ICS-300/400 and other NIMS-compliant efforts in Texas. Funding sources should be considered outside of traditional DSHS funding sources (i.e. grants).

7. Air/Ground Ambulance Utilization Criteria

Disaster/Emergency Preparedness Task Force recommends that the ambulance utilization criteria utilized for the 2006 hurricane season<u>and future All-Hazard disaster guidelines</u> be formalized in<u>all EMS and healthcare facility, local, state, regional, and tribal jurisdictional</u> disaster guidelines and/or policies/procedures_(See following page).

All pre-hospital personnel will be operating under the medical control and/or protocols of their agency's medical director except in the case of cardiopulmonary arrest (See *Attachment 2* contained herein)

AIR AND GROUND AMBULANCE UTILIZATION CRITERIA FOR STATEWIDE DISASTER AND HURRICANE EVACUATIONS

Ground Ambulance Utilization Criteria:

Only patients who meet one of following criteria should be considered for transport by ground ambulance:

- 1. Medical oxygen being provided at greater than 4 liters per minute,
- 2. Continuous hemodynamic and cardiac monitoring is required,
- 3. Continuous intravenous (IV) medication drip that requires monitoring, such as an IV pump or similar method for delivering precise amounts ("to keep open" IVs, Peg tubes, and vitamin drips would not fall into this category), or
- 4. Orthopedic injuries that require appliances or other acute medical conditions that would prohibit the patient from traveling on an alternate method of transport (e.g. active labor; cervical traction; unstable pelvic fracture)

Air Ambulance Utilization Criteria*:

Only patients who meet one of following criteria should be considered for transport by air ambulance:

- 1. Transfers from one critical care area to another critical care area (e.g., intensive care unit ((ICU)); cardiac care unit ((CCU)); pediatric intensive care unit ((PICU)); burn unit);
- 2. Continuous intravenous vasoactive medications or blood products (e.g., nipride; dopamine; neosynephrine; etc.);
- 3. Emergent surgical interventions; or
- 4. Acute medical conditions requiring special interventions (e.g., active labor; evolving stroke; intra-aortic balloon pump ((IABP)); left ventricular assist device ((LVAD)); continuous veno-venous hemodialysis ((CVVHD)); isolette transports with advanced life support ((ALS)) interventions; etc.)
- * Note: these criteria DO NOT apply to Texas National Guard and\or US Department of Defense aircraft used in a region-wide evacuation.

Effective July 19, 2006

Texas Department of State Health Services Regulatory Services Division Office of EMS/Trauma Systems Coordination 1100 West 49th Street Austin, TX 78756 512-834-6700

8. Altered Standards of Care for EMS operations in evacuation/large-scale disaster

After consultation and collaboration with the GETAC EMS Medical Directors committee, the Disaster/Emergency Preparedness Task Force recommends that the following Altered Standards of Care be adopted statewide during hurricane evacuation and other large-scale disasters. (See *Attachment 2* contained herein)

9. Multi-TSA Regional Response

The Disaster/Emergency Preparedness Task Force recommends that DSHS establish multi-TSA region<u>al medical operations centers</u> for large-scale, statewide activations, such as hurricane evacuations. (See Item 10). The Task Force is aware of other large-region concepts that are in discussion in emergency management circles throughout Texas. The Task Force recommends that the boundaries incorporate the Trauma Service Area boundaries where feasible, but that consistency with the final large-region map that will be utilized by GDEM/COGs and the Regional IMTs is critical. See attached map for the Task Force's recommended regions. The proposed large-region map nearly aligns RACs, COGs and Public Health regions. (See **Attachment 3** contained herein)

10. Regional Medical Operations Centers (RMOCs)

The Disaster/Emergency Preparedness Task Force recommends that a Regional Medical Operations Center (RMOC) be established in each multi-TSA region (See Item 9). RMOCs will provide comprehensive and integrated ESF-8 functions to local Emergency Operation Center (EOCs), Multi-agency Coordination Center (MACCs) and Disaster District Committees (DDCs). RMOCs should be written into the Council of Government (COG) MACC plans as the ESF-8 coordination entity. Stakeholder agencies that should be included in RMOC planning would include, but are not limited to:

- o Public Health Representative(s)
- Hospital representative(s)
- EMS representative(s)
- Special Needs Representative
- Shelter Representative
- Medical Examiners
- Regional Liaison Officers
- o Local Offices of Emergency Management
- Regional Advisory Councils (RACs)
- Nursing Home Coalitions

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Additional detail on RMOCs and their specific responsibilities and proposed Standing Operating Procedures (SOPs) will be submitted to DSHS as a separate recommendation after the May, 2007 meeting.

11. EMS State Deployment Concept of Operations (ConOps)

State Level Coordination

EMS Operations Personnel/State of Texas Interface: In order to facilitate the effective use of EMS/Ambulance resources statewide, a cadre of pre-qualified and trained senior EMS leadership personnel, approved by DSHS and GDEM, shall function within the State Operations Center and/or the DSHS MACC to supplement DSHS personnel and provide subject matter expert support related to EMS operational issues and resource management. Qualifications are currently under development, but should include compliance with the Federal NIMS Credentialing Standards for EMS Personnel at the Medical Branch Director level or better. Specifically, personnel selected shall be able to provide the following types of support:

- Strategic/Policy Guidance specific to EMS functions (both movement of patients between facilities and provision of local/regional EMS services post disaster)
- A source of vetting of incoming out-of-state EMS/Ambulance resources
- Assisting in the 'packaging' of resources into Strike Teams or Task Forces for effective deployment
- Effective regional/local outreach to EMS assets as needed
- Interface and guidance regarding the deployment of EMS resources and tracking of those resources via WebEOC
- Provide accountability back to sponsoring agency EMS Administrator / Fire Chief for assets that are deployed

Resource Request Process: EMS/Ambulance resources should be requested via established State of Texas Emergency Management procedures from GDEM to ESF-8 desk (DSHS) and then to the DSHS MACC. The DSHS MACC should call up the necessary ambulance strike teams through the Regional EMS Resource Coordination Centers in each RAC. The DSHS Activation Order will then be faxed once the specific agencies from each strike team are determined. The Activation Order should include all pertinent information, including check-in and staging locations and command/control elements.

Once activated, the EMS Branch Director and DSHS staff shall track the ambulances through WebEOC in the Response Resources boards. The Response Resources Boards are designed to allow for assignment to up to nine (9) divisions/branches and tracking the assets at the division/branch level.

As check-in is conducted, the ambulance strike team leader (STL) shall be assigned a mission and a division. The divisions are managed either by the Air/Ground Coordination Team or a Regional Medical Operations Center, as dictated by the mission.

The Division/Branch Supervisor is tasked with establishing a communications plan for the area of operation, assigning and tracking missions to the ambulance strike teams and for accountability to all ambulances and personnel assigned to the division.

Ambulances that depart the Area of Operation and are no longer in communication with their strike team leader or division supervisor can utilize the DSHS MACC/EMS Branch Director to update their status and obtain their next assignment.

Demobilization of ambulances will be done in conjunction with the division supervisor and the EMS Branch Director/DSHS MACC.

12. American Red Cross standardized policy Medical Care in Shelters Standardized Policy

The Disaster/Emergency Preparedness Task Force recommends that <u>DSHS</u> <u>partners with</u> the American Red Cross <u>and other ESF-6 partners</u> adopt a standard philosophy and policy to allow and support outsourcing of medical/clinical care in ARC shelters. <u>While the Task Force realizes that mass care is an ESF 6 function, medical care in these shelters is a shared <u>responsibility between ESF-6 and ESF-8 responsible agencies.</u> At present, there is inconsistency throughout the state on this issue.</u>

- a. Hospitals and/or other healthcare facilities or medical providers will support the concept of medical/clinical operations in shelters.
- b. DSHS will work with American Red Cross (ARC) to adopt a system, for general population shelters to determine medical services that are appropriate for each shelter, and will provide space and equipment/supplies in cooperation with the hospital or other medical entity that is supporting the clinic in the shelter. (i.e. medical schools, Medical Reserve Corps, etc).

c. Medical personnel assigned to these shelters should provide primary care and triage functions, and also assist shelter residents with such items as prescription renewals, direction on seeking specialized care in the community or services from local public health providers, and similar services.

13. Comfort Station Staffing by Medical Providers during Evacuations

The Disaster/Emergency Preparedness Task Force supports the concept of medical personnel at evacuation route comfort stations. Due to the limited number of EMS units, the D/EP-TF recommends that comfort stations could be manned by EMS personnel and some medical equipment, but not necessarily an EMS unit stationed at the comfort station.

It is further recommended that other healthcare-related personnel beyond EMS services should be considered to staff these Comfort Stations, including nursing and medical schools or other available medical personnel.

14. Responsibilities of Healthcare Facilities

The Disaster/Emergency Preparedness Task Force recommends the following issues be resolved and plans put into place by hospitals, nursing homes, long term care facilities, and other providers licensed by DSHS, that are evacuating patients:

- A. The Evacuating Hospital or other facility has a **responsibility to send** clinical personnel, at the level appropriate to sustain care of the evacuating patients, (i.e. RNs, LVNs, Pharmacists, physicians, etc) with their patients to the destination hospital or other facility. These personnel will remain FTEs of the evacuating facility until after the response phase is over and the recovery phase begins.
- B. The evacuating facility has a responsibility to have a plan in place to address the specific needs of their facilities' employee's family during evacuation.
- C. DSHS policies and guidance should be consistent and align with current and any subsequent federal guidelines during disaster operations, including but not limited to, modified EMTALA and HIPAA regulations. These modified interpretations should be activated upon the onset of the evacuation order.
- D. As soon as possible, DSHS should coordinate repatriation of evacuated patients who are appropriate for transfer back to the

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<#>DSHS should define the beginning of the evacuation phase to be consistent with the State Operations Center's initiation of coastal evacuation operations. This will vary based on storm factors, but generally is H-96. The end of the evacuation phase should be defined as H + 72 hours.¶

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sending facility with the appropriate jurisdictions. This should include healthcare providers and potentially family members.

E. DSHS should adopt <u>guidelines</u> or other <u>processes</u> that will allow reciprocity of RNs and other certified or licensed healthcare providers to work in the destination hospitals or other facilities with limited liability to the personnel and the employer during the evacuation phase of the crisis. Deleted: rules
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15. Hospital Bed Definitions and Bed reporting Processes

The Disaster/Emergency Preparedness Task Force recommends the following definitions and processes be adopted immediately.

Recommended Bed Definitions:

Definition of an "available bed" for the purpose of disaster bed reporting:

Beds that are licensed, physically available and have staff on hand (within 4 hours) to attend to the patient who occupies the bed but is vacant. (See attached document for specific definitions.)

16. Bed Reporting Process:

All general hospitals should now have EMSystem and/or WebEOC access for electronic bed reporting. This process needs to be exercised prior to June 1, 2007.

The data entered into WebEOC and/or EMSystem will be interconnected, allowing hospitals to enter their data in the designated regional reporting system. The data will ultimately reside in WebEOC and reported to DSHS MACC via WebEOC, via summary view.

Reports available from EMSystem/WebEOC will serve to complete the requirements of the agencies/projects of:

- > NDMS
- DSHS/GDEM
- HAVeBED
- DSHS Licensing standards

Attachment 1

Helicopter MOA Proposal

For more information

Contact Rickey Reed, Tx Assn of Air Medical Services (TAAMS)

disaster committee chair

Feb. 5, 2007

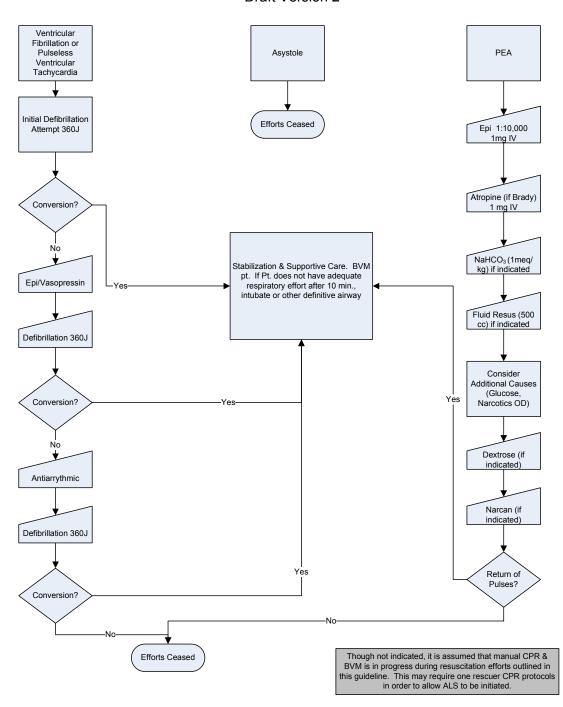
All aspects of the cost reimbursement from the DSHS Ground Ambulance MOA (revised) with respect to personnel salaries, backfill, supplies, disposables, and expenses per day per employee, plus the helicopter fee schedule below:

Aircraft Type	# of Engines	# of patients	Daily fee	cost per flight hour	# of hrs per activation
Bell 412	2	more than 2	\$ 5,000	\$ 1,800	2
Sikorsky S76	2	more than 2	\$ 5,000	\$ 1,800	2
EC 145	2	2 pts	\$ 4,000	\$ 1,500	2
EC 135	2	2 pts	\$ 4,000	\$ 1,500	2
BK 117	2	2 pts	\$ 4,000	\$ 1,500	2
Augusta 109	2	2 pts	\$ 4,000	\$ 1,500	2
Bell 430	2	2 pts	\$ 4,000	\$ 1,500	2
Bell 206 L	1	1 pt	\$ 3,500	\$ 1,200	2
Bell 407	1	1 pt	\$ 3,500	\$ 1,200	2
A-Star	1	1 pt	\$ 3,500	\$ 1,200	2

Attachment 2

Modified Cardiac Arrest Resuscitation Guidelines For Evacuation Scenarios

Draft Version 2



Attachment 3

